

IN THE CLAIMS:

Please amend the claims as follows:

1. (Currently Amended) An apparatus for converting migration and conversion of software code of a source application on a ~~from any~~ source platform into software code of a target application on a ~~to any~~ target platform ~~that migrates and/or converts~~ ~~any source application working on any platform into a format of any target platform~~ ~~comprises of~~, the apparatus comprising:

an inputting means for accepting the ~~entire~~ source code of the source application

~~sample part in ASCH~~ to analyse ~~the~~ business logic of the source application, obtaining ~~UI (User Interface (UI) / GUI (Graphical User Interface))~~ details of the source ~~and target~~ application, ~~also~~ receiving a validation scheme ~~schemes~~ of a source front-end interface, obtaining (1) a ~~the~~ definitions of a ~~the~~ target back-end system, (2) the existing test scripts to facilitate ~~the~~ quality control ~~phase of the generated~~ software code for the target application, (3) the source code entry points to business processes, (4) target environment specification ~~or definitions which includes~~ including the target platform (s), languages to be used, target database, coding standards, target architecture and framework, (5) third party components, (6) existing applications ~~which have~~ to be plugged with the target application, and (7) sample code for the target application ~~working in the target environment (if available);~~

an analysing means for analysing ~~the~~ provided source schemes ~~provided by the client~~ to create target schemes, analysing the business logic of ~~in~~ the source application to create workflow diagrams that represent processes of the source

application processes, identifying the code segments of in the source application, and analysing the target environment to generate ~~the a~~ target architecture and associated ~~the~~ technology ~~associated with it~~;

a setting up means for generating a custom knowledge base for the software code conversion that is responsive to no existing knowledge base for particular migration existing, wherein the custom knowledge base comprises a relational database comprising source and target code patterns and attributes and residing on a non-transitory computer-readable storage medium ~~where the existing KB is reviewed for particular migration and in case of no such KB exist, a custom KB is created~~;

a processing means for conversion of source code ~~in~~ into a format of the target environment specification, wherein the ~~complete~~ source code is passed through a knowledge engine for a plurality of iterations, on the basis of iteration and during this time the knowledge engine remains coupled to the custom knowledge base during the plurality of iterations for conversion of the source code ~~in~~ into the format of the target environment specification, specifications; and after each iteration the knowledge base is updated to include additional ~~which leads to speedy and better conversion of source code as the Custom KB has now more~~ structured information of the source platform and the source application with respect to the target platform and the target environment specification after each iteration to cause the knowledge engine to enhance source code conversion in subsequent iterations ~~specifications~~; and

a documenting means for generation of a report comprising a portion of the source reports during review of the process stage and a summary report after the end of the conversion process, which consists of the code of the source application that is not converted automatically for manual conversion. ~~, this unconverted code is then converted manually at applicants resource center.~~

2. (Currently Amended) The apparatus in claim 1 wherein an existing knowledge base ~~a 'Knowledge Base Database (KB)'~~ is provided for understanding the source application ~~and~~ , the source platform, as well as the target environment specification, specifications and the target platform.
3. (Currently Amended) The apparatus in claim 1, wherein the processing means is further configured ~~a 'Knowledge Engine (KE)' is provided~~ to extract the business logic and database ~~[[back-end]]~~ schema of the source application systematically and logically and to convert them ~~it~~ into a the format specified for the target application.
4. (Currently Amended) The apparatus in claim 1, wherein the processing means is further configured to dynamically hatch new patterns to be used to convert the source code into the format of the target environment specification. ~~'Knowledge Database' is updated after each iteration by 'KE' to provide wider knowledge of source application during the conversion process, leading to speedy and better future conversions.~~
5. (Currently Amended) The apparatus in claim 1, wherein the processing means is further configured to apply fuzzy rules to perform optimal conversion of the source code into the format of the target environment specification. ~~a report is generated~~

~~after conversion, which consist of, the unconverted source code by the automatic migration process.~~

6. (Currently Amended) The apparatus in claim 1, wherein the processing means is further configured to utilize neural networks to convert the source code into the format of the target environment specification. ~~any target platform as claimed in any of the preceding claims that learns from the iterations completed by ‘Knowledge Database’ which increases the rate of automatic migration in next iteration.~~
7. (New) A method for converting software code of a source application on a source platform into software code of a target application on a target platform, the method comprising:

accepting the source code of the source application to analyse business logic of the source application;

obtaining User Interface (UI) details of the source application;

receiving a validation scheme of a source front-end interface;

obtaining (1) a definition of a target back-end system, (2) existing test scripts to facilitate quality control of generated software code for the target application, (3) source code entry points to business processes, (4) target environment specification including the target platform, languages to be used, target database, coding standards, target architecture and framework, (5) third party components, (6) existing applications to be plugged with the target application, and (7) sample code for the target application;

analysing provided source schemes to create target schemes;

analysing the business logic of the source application to create workflow diagrams
that represent processes of the source application;
identifying code segments of the source application;
analysing the target environment to generate a target architecture and associated
technology;
responsive to no existing knowledge base for the software code conversion existing
~~exists~~, generating a custom knowledge base for the software code conversion,
wherein the custom knowledge base comprises a relational database
comprising source and target code patterns and attributes and residing on a
non-transitory computer-readable storage medium;
converting the source code into a format of the target environment specification,
wherein the source code is passed through a knowledge engine for a plurality
of iterations, the knowledge engine remains coupled to the custom knowledge
base during the plurality of iterations for conversion of the source code into
the format of the target environment specification, the custom knowledge base
is updated to include additional structured information of the source platform
and the source application with respect to the target platform and the target
environment specification after each iteration to cause the knowledge engine
to enhance source code conversion in subsequent iterations; and
generating a report comprising a portion of the source code of the source application
that is not converted automatically for manual conversion.

8. (New) The method of claim 7, further comprising:

dynamically hatch new patterns to be used to convert the source code into the format of the target environment specification.

9. (New) The method of claim 7, wherein converting the source code into a format of the target environment specification comprises:
applying fuzzy rules to perform optimal conversion of the source code into the format of the target environment specification.
10. (New) The method of claim 7, wherein converting the source code into a format of the target environment specification comprises:
utilizing neural networks to convert the source code into the format of the target environment specification.
11. (New) The method of claim 7, wherein an existing knowledge base is provided for understanding the source application, the source platform, the target environment specification, and the target platform.
12. (New) The method of claim 7, further comprising:
extracting the business logic and database schema of the source application
systematically and logically; and
converting the extracted business logic and database schema of the source application into a format specified for the target application.
13. (New) A non-transitory computer-readable storage medium encoded with executable computer program code for converting software code of a source application on a source platform into software code of a target application on a target platform, the computer program code comprising program code for:

accepting the source code of the source application to analyse business logic of the
source application;
obtaining User Interface (UI) details of the source application;
receiving a validation scheme of a source front-end interface;
obtaining (1) a definition of a target back-end system, (2) existing test scripts to
facilitate quality control of generated software code for the target application,
(3) source code entry points to business processes, (4) target environment
specification including the target platform, languages to be used, target
database, coding standards, target architecture and framework, (5) third party
components, (6) existing applications to be plugged with the target
application, and (7) sample code for the target application;
analysing provided source schemes to create target schemes;
analysing the business logic of the source application to create workflow diagrams
that represent processes of the source application;
identifying code segments of the source application;
analysing the target environment to generate a target architecture and associated
technology;
responsive to no existing knowledge base for the software code conversion existing
~~exists~~, generating a custom knowledge base for the software code conversion,
wherein the custom knowledge base comprises a relational database
comprising source and target code patterns and attributes and residing on a
non-transitory computer-readable storage medium;

converting the source code into a format of the target environment specification,
wherein the source code is passed through a knowledge engine for a plurality
of iterations, the knowledge engine remains coupled to the custom knowledge
base during the plurality of iterations for conversion of the source code into
the format of the target environment specification, the custom knowledge base
is updated to include additional structured information of the source platform
and the source application with respect to the target platform and the target
environment specification after each iteration to cause the knowledge engine
to enhance source code conversion in subsequent iterations; and
generating a report comprising a portion of the source code of the source application
that is not converted automatically for manual conversion.

14. (New) The non-transitory computer-readable storage medium of claim 13, wherein
the computer program code further comprising program code for:
dynamically hatch new patterns to be used to convert the source code into the format
of the target environment specification.
15. (New) The non-transitory computer-readable storage medium of claim 13, wherein
converting the source code into a format of the target environment specification
comprises:
applying fuzzy rules to perform optimal conversion of the source code into the format
of the target environment specification.
16. (New) The non-transitory computer-readable storage medium of claim 13, wherein
converting the source code into a format of the target environment specification
comprises:

utilizing neural networks to convert the source code into the format of the target environment specification.

17. (New) The non-transitory computer-readable storage medium of claim 13, wherein an existing knowledge base is provided for understanding the source application, the source platform, the target environment specification, and the target platform.
18. (New) The non-transitory computer-readable storage medium of claim 13, wherein the computer program code further comprising program code for:
extracting the business logic and database schema of the source application
systematically and logically; and
converting the extracted business logic and database schema of the source application
into a format specified for the target application.